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BUDGET DEVELOPMENT REPORT LEAD AND ASBESTOS ABATEMENT WORK FORMER RAINIER BREWERY FACILITY SEATTLE, WASHINGTON CO# 990801

## Prepared For:

Mr. Joseph Alhadeff Benaroya Capital Company 1001 Fourth Avenue, Suite 4700 Seattle, Washington 98101

## Prepared By:

James P. Hurley Company P.O. Box 82206 Kenmore, WA 98028 Phone: (425) 486-6665

Date Prepared:

August 31, 1999

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2,41101111	Rainier Brewery Company, Seattle, Washington, dated June 27, 1989	
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Benaroya Capital Company, LLC 1001 Fourth Avenue, Suite 4700 Seattle, WA 98154

Attn.: Mr. Joseph Alhadeff

BUDGET DEVELOPMENT REPORT LEAD AND ASBESTOS ABATEMENT WORK FORMER RAINIER BREWERY FACILITY SEATTLE, WASHINGTON

Dear Joe:

At your direction, the James P. Hurley Company (JPHC), an environmental consulting firm, performed an investigation of potential hazardous materials on the subject property to determine probable removal and disposal costs relating to the renovation and/or demolition activities. This letter report summarizes the findings and opinions of our investigation.

#### **BACKGROUND**

Benaroya Capital Company (BCC) is currently negotiating the purchase of the subject property with the intention of converting the facilities into multiple tenant warehouse and industrial space. A previous asbestos survey of the property was conducted by Hall Kimbrall (HK) for G. Heileman Brewing Company in 1989. The HK results were summarized in their report entitled Prioritized Asbestos Assessment Study of Rainier Brewery Company, Seattle, Washington, dated June 27, 1989.

## **SCOPE OF SERVICES**

We were directed to provide the following specific services:

 Review the HK asbestos abatement cost estimates and provide recommendations for alternative actions that would minimize the cost impact of this work.

- Perform additional sampling of suspected asbestos containing materials (ACM), which were not sampled by HK including finish materials and roofs, and provide asbestos abatement cost estimates for ACM which were not identified in the HK investigation.
- 3. Perform supplementary lead based paint assessment services and make recommendations for remedial alternatives that would minimize the impact of hazardous material abatement and disposal costs during the planned demolition and renovation project.

### ASBESTOS ABATEMENT BUDGET

After reviewing the HK report and conducting a thorough survey of the property ourselves, we believe that asbestos containing thermal system insulation throughout the facilities is accurately documented in the HK report. We also reviewed documentation that confirmed that a limited amount of asbestos abatement and maintenance work was performed in the facilities in late 1998 and early 1999. Our field investigation confirmed that much of the thermal system ACM is in poor condition due to deferred maintenance and prolonged exposure to high humidity and physical damage. We recommend repairing the damaged ACM prior to occupying the facilities. We estimate that the cost to repair the damaged ACM would not exceed \$20,000.00.

The HK investigation excluded testing interior finish materials and exterior surfacing materials. We included testing such materials and we identified interior flooring, plaster, and exterior roofing materials in our investigation (refer to Table 7, Summary of Asbestos Test Results).

Given the likelihood that new tenants will not need or want brewery mechanical equipment, we assume that the space-consuming components such as brew kettles, processing tanks, and grain silos will be removed from the facilities. In most cases, asbestos abatement must be performed in adjacent areas before commencing this work. In many cases, we anticipate that asbestos abatement work will be needed prior to the installation of new electrical and mechanical systems. We also anticipate that much of the ACM can remain in place as long as reasonable operational and maintenance precautions are undertaken. Due to the variances in future tenant needs, the asbestos abatement costs cannot be accurately determined until the plans for occupancy are known.

For budgetary purposes, we calculated asbestos abatement costs assuming that all of the identified ACM is removed. We estimate that the costs would range between \$848,692.00 and \$1,156,171.00 (see Tables 1 through 6) for the entire complex. The most important factors in controlling the asbestos abatement costs are the scope of the tenant requirements and the timing and

sequencing of the work. If the abatement work were performed in a single phase prior to occupancy, the lower end of our estimate range would be appropriate. If the work were performed in multiple phases after the facilities are occupied, the higher end would be appropriate. If the tenant requirements are such that existing ACM can remain in place, the asbestos abatement costs can be reduced significantly below the lower range of our estimate.

At your request, we categorized the estimated asbestos abatement costs in Tables 1 through 6 under the following functional groups:

- Office
- Brewery
- Utility
- Engineering
- Warehouse

We also categorized the estimated costs as they pertained to the east parcel and west parcel, respectively.

## **LEAD BASED PAINT INVESTIGATION FINDINGS**

On August 5, 1999, JPHC proceeded with a lead paint survey of the subject facility. We collected thirty-nine (39) representative samples of paints from the interior and exterior surfaces of the facilities. All thirty-nine samples were positive for lead at levels ranging between 0.01 and 6.4 parts per million (ppm). Refer to Table 8, Summary of Lead Paint Test Results.

## **DISCUSSION OF LEAD BASED PAINT STANDARDS**

In May of 1993, the federal Occupational Health & Safety Administration (OSHA), established construction standards (29 CFR 1926.62) making requirements for contractors performing demolition work in facilities with lead-containing materials to control and manage activities where potential exposure to lead could occur. These standards would apply to the planned demolition and renovation projects at the subject property. Specific requirements for the contractor include exposure monitoring, development of a written health and safety program, medical surveillance, and the use of personal protective equipment. The OSHA requirements for the contractor to perform these added measures will result in additional construction costs.

Disposal of lead containing solid waste is a significant factor when considering the cost of the planned demolition and renovation project. The Washington State Dangerous Waste Regulations (WAC 173-303-090-8) characterize lead-containing solid waste as "dangerous" waste if the Toxicity

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Characteristic Leaching Procedure (TCLP) extract of a representative sample of the solid waste contains concentrations equal to or greater than 5 milligrams per liter (mg/L). These regulations will apply to any demolition waste originating from the subject property.

## RECOMMENDATIONS FOR LEAD BASED PAINT

We recommend implementing a lead hazard safety program prior to commencing with construction and maintenance activities that will impact lead based paint coated materials throughout the facility. For each workplace or work operation, it shall be initially determined if any employee may be exposed to lead at or above the action level through the use of air monitoring. Once the initial determination is complete, workers must be provided with training and safety equipment to perform the work activities in accordance with the program.

In the buildings slated for demolition, representative bulk samples of building materials should be submitted for TCLP analysis (for lead) to properly categorize the waste per the dangerous waste regulations.

The exposed soil surrounding Buildings 17 and 41 should be tested for total lead and the results should be compared to the appropriate Model Toxics Control Act (MTCA) cleanup standards.

### RECOMMENDATIONED LEAD BASED PAINT BUDGET

We recommend allowing \$40,000.00 for costs associated with handling and disposing lead-based paint coated materials. In compiling this allowance amount, we assumed that a general contractor using controlled techniques under a reasonable health and safety program could accomplish the renovation and demolition work without hiring a "lead abatement" subcontractor.

### ASSUMPTIONS/CLARIFICATIONS

Our discussion of probable costs associated with the treatment of hazardous materials on the subject property is based on current regulatory requirements and construction techniques.

### **LIMITATIONS**

This report has been prepared for the specific application of this project in a manner consistent with the level of care normally exercised by members of the environmental science profession currently practicing under similar conditions in the area.

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No other warranty, expressed or implied, is made. No investigation is thorough enough to exclude the presence of hazardous materials on a given site. Therefore, if no hazardous materials have been identified during this assessment, this should not be construed as a guarantee of the absence of such materials, but merely as the result of services performed within the scope, limitations, and cost of work performed.

Services thereunder were performed in accordance with our agreement and understanding with our client, which may be fully disclosed in this document. Opinions and/or recommendations are intended for the client, purpose, site, location, time frame, and project parameters indicated. This report was prepared solely for the use of our client, and should be reviewed in its entirety; we are not responsible for subsequent separation, detachment, or partial use of this document. Any reliance on this report by a third party shall be at such party's sole risk.

If you should have any questions regarding the material covered in this report, please call.

Sincerely,

<del>JA</del>MES <u>P. HURLEY C</u>O.

James P. Hurle

President